



Univerza v Mariboru

Fakulteta za naravoslovje
in matematiko

OPIS PREDMETA / SUBJECT SPECIFICATION

Predmet: Kemijska izobraževalna komunikacijska tehnologija
Subject Title: Chemical education communication technology

Študijski program Study programme	Študijska smer Study field	Letnik Year	Semester Semester
Enovit magistrski študijski program druge stopnje Predmetni učitelj Five-year master's degree program Subject Teacher	/	5.	zimski/Autumn

Univerzitetna koda predmeta / University subject code:

Predavanja Lectures	Seminar Seminar	Sem. vaje Tutorial	Lab. Vaje Lab. Work	Teren. vaje Field work	Samost. delo Individ. work	ECTS
30	30				150	7

Nosilec predmeta / Lecturer:

doc. dr. Majda Krajnc

Jeziki /

Predavanja / Lecture:

slovenski / Slovenian

Languages:

Vaje / Tutorial:

slovenski / Slovenian

Pogoji za vključitev v delo oz. za opravljanje študijskih obveznosti:

Ni posebnih pogojev.

Prerequisites:

No special prerequisites.

Vsebina:

Contents (Syllabus outline):

Predavanja:

Elektronski način poučevanja in učenja.

Pri predmetu študentje spoznajo in usvojijo naslednja znanja in veščine:

- elektronsko okolje za komunikacijo

študent/profesor. Poudarek bo na:

- a) vnašanju besedila in sporočil,
- b) nalaganja dokumentov v elektronski obliki,
- c) pošiljanja rezultatov izpitov,
- d) izdelavi banke za e-teste in
- e) izvajanju e-testov.

- osnove izdelave elektronskih študijskih gradiv.

Seminar:

Izdelava seminarske naloge v obliki e-gradiva.

Lectures:

The electronic manner of teaching and learning.

At the course students adopt the following knowledge and skills:

- electronic environment for communication student/lecturer. The emphasis will be:

- a) how to input the text and messages,
- b) how to load documents on the portal,
- c) how to send exam results,
- d) how to prepare the bank with questions for e-test,
- e) how to execute e-tests.

- the basis of preparation the electronic study material.

Seminar:

Elaboration of the seminary work as electronic study material.

Temeljni študijski viri / Textbooks:

1. Učno poučevalno okolje Moodle, <http://eizobrazevanje.uni-mb.si>
2. eXe-orodje za pripravo e-gradiv. <http://www.exelearning.org/>

Cilji:

- osvojiti moderne tehnologije, ki izboljšajo in olajšajo delo v izobraževalnem procesu.

Objectives:

- adopt the technologies which improve and ease work in educational process.

Predvideni študijski rezultati:

Intended learning outcomes:

<p><u>Znanje in razumevanje študenta:</u></p> <ul style="list-style-type: none"> - razumevanje in uporaba elektronskih tehnologij za učinkovitejši študij, <p><u>Prenesljive/ključne spretnosti in drugi atributi:</u></p> <ul style="list-style-type: none"> - sposobnost prenašanja znanja dela z modernimi učnimi tehnologijami.

<p><u>Knowledge and Understanding:</u></p> <ul style="list-style-type: none"> - understanding and use of electronic technologies for efficient study. <p><u>Transferable/Key Skills and other attributes:</u></p> <ul style="list-style-type: none"> - qualification of transferring the knowledge how to work with modern learning technologies.

Metode poučevanja in učenja:

Learning and teaching methods:

<ul style="list-style-type: none"> - elektronski način poučevanja in učenja, - seminarsko delo, - mentorski način poučevanja.
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<ul style="list-style-type: none"> - electronic manner of teaching and learning, - seminar work, - mentoring manner of teaching.

Delež (v %) /

Načini ocenjevanja:

Weight (in %)

Assessment:

<p>Pri predmetu je predvideno tudi elektronsko preverjanje znanja. Uspešno izveden elektronski test je enakovreden ustnemu izpraševanju. Izpit je opravljen, če so pozitivno opravljene naslednje obveznosti:</p> <ul style="list-style-type: none"> - ustno izpraševanje, - izdelana seminarska naloga, - predstavitev seminarske naloge 	<p>40</p> <p>40</p> <p>20</p>	<p>The electronic examination is also expected at the course. If student successfully passes e-test, then the oral part of the final exam is done. Student passes the examination if s(he) successfully passed the following obligations:</p> <ul style="list-style-type: none"> - oral examination, - elaboration of seminary work, - presentation of seminary work.
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Materialni pogoji za izvedbo predmeta :

Material conditions for subject realization

<ul style="list-style-type: none"> - predavalnica z multimedijskimi pripomočki, - računalniška učilnica.
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<ul style="list-style-type: none"> - lecture room with multimedia facilities, - computer room.
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Obveznosti študentov:

Students' commitments:

<ul style="list-style-type: none"> - ustni/elektronski izpit, - izdelana seminarska naloga. 	<ul style="list-style-type: none"> - oral/electronic exam, - completed seminary work.
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Reference nosilca / Lecturer's references:

1. LUKMAN, Rebeka, KRAJNC, Majda. Exploring non-traditional learning methods in virtual and real-world environments. *Educ. technol. soc.*, 2012, vol. 15, no. 1, str. 237-247. http://www.ifets.info/journals/15_1/21.pdf.
2. PETEK, Aljana, KRAJNC, Majda. The enthalpy and entropy of activation for ethyl acetate saponification. *Int. j. chem. kinet.*, 2012, vol. 44, issue 10, str. 692-698, doi: [10.1002/kin.20712](https://doi.org/10.1002/kin.20712).
3. LUKMAN, Rebeka, LOZANO, Rodrigo, VAMBERGER, Tamara, KRAJNC, Majda. Addressing the attitudinal gap towards improving the environment : a case study from a primary school in Slovenia. *J. clean. prod.*. [Print ed.], Available online 12 August 2011, doi: [10.1016/j.jclepro.2011.08.005](https://doi.org/10.1016/j.jclepro.2011.08.005).
4. KRAJNC, Majda. E-learning environment integration in the chemical engineering educational process. *Int. j. eng. educ.*, 2009, vol. 25, no. 2, str. 349-357. http://www.ijee.ie/latestissues/Vol25-2/s18_ijee2119.pdf.
5. KRAJNC, Majda, KOVAČ KRALJ, Anita, GLAVIČ, Peter. Heat integration in a speciality product process. *Appl. therm. eng.*. [Print ed.], June 2006, vol. 26, iss 8/9, str. 881-891. <http://dx.doi.org/10.1016/j.applthermaleng.2005.09.018>.